

North Dakota Plans First Envirothon

The first state Envirothon competition is being planned for North Dakota. The Coalition for Conservation and Environmental Education (C²E²) is organizing the outdoor environmental skills competition for high school students.



The Envirothon Program started in 1979 in Pennsylvania but has now spread to a number of states throughout the country. Every year, the Envirothon focuses on four main topics: wildlife, forestry, soils and aquatics. A fifth environmental issue is selected at random. The fifth topic chosen for the year 2000 competition is wetlands.

North Dakota's Envirothon is scheduled for May 8, 2000, at Wesley Acres near Valley City, N.D. Up to 10 teams are expected to compete. The winning team will advance to the national competition in Nova Scotia Aug. 1 through 6, 2000.

An Envirothon workshop was held Aug. 16 and 17, 1999, in Bismarck, N.D. Forty individuals from throughout North Dakota attended the training. Representatives from soil conservation districts, the Natural Resources Conservation Service, resource conservation and development councils, public school systems, and state agencies received training about the requirements and rules of an Envirothon competition.

If you are interested in organizing a local/regional Envirothon or volunteering to help at the state Envirothon in May, please contact Dianne Olson, state envirothon coordinator, at 701.845.1674.

The Coalition for Conservation and Environmental Education (C²E²) is a group of agencies, organizations and individuals interested in providing quality environmental education for North Dakota youth. Currently, there are 47 members from across the state. If you are interested in learning more about C²E², please contact Jim Collins Jr. at 701.328.5161.

Envirothon Coordinator Dianne Olson explains the history of the competition at an August workshop.

Scout Troop 54 Stencils Drains in Mandan

Scout Troop 54 recently completed a storm drain stenciling program in Mandan, N.D. Under the leadership of Eagle Scout Jeremiah Trnka, 20 scouts took to the streets of Mandan Sept. 25, 1999. The scouts used paint and stencils to leave the message "Dump No Waste ... Feeds Fresh Water" on curbs throughout town.

Scout Troop 54 received two monetary donations that enabled them to purchase paint, goggles, brooms, gloves and safety vests. Stencils were donated by the U.S. Bureau of Reclamation.

Stencils were placed so that part of the message was situated on the vertical curb, and the rest of the message was on the horizontal part of the curb and gutter. Spray paint was applied, and the stencil was then removed. Scouts attempted to place

Scouts from Troop 54 stencil Mandan storm drains.

stencils as near to storm drain inlets as possible. About 550 stencils were painted in Mandan.

Hats off to Scout Troop 54!

During the spring of 1999, two separate incidents led to the discharge of pollutants into surface waters in the Bismarck-Mandan area. In Bismarck, used motor oil was dumped into a storm drain that discharged into Hay Creek, a tributary of Apple Creek and the Missouri River. The second incident involved an illegal discharge of hazardous waste into the Mandan City storm sewer system. Mandan's storm sewer system discharges to the Heart River and eventually into the Missouri River.

Jim Collins Jr. (right) from the North Dakota Department of Health presents donor checks to Troop 54 Scout leader Jim Steiman (center) and Eagle Scout candidate Jeremiah Trnka (left).



Girl Scout Water Drop Patch Project Unveiled

In late October, EPA announced the release of a new Water Drop Patch Project, a collaborative effort between the Girl Scouts of the USA and EPA. The project, which began as a pilot in the Washington, D.C., area, is now national. The project includes 20 different watershed activities in which Girl Scouts can get involved. Once they complete a required number of activities, Girl Scouts earn a water drop patch to wear on their uniforms.

The purpose of the project is to encourage girls to:

- ◆ Make a difference in their communities by becoming watershed and wetland stewards.
- ◆ Use their skills and their knowledge to educate others in their community about the need to protect the nation's valuable water resources.
- ◆ Explore the natural world to gain an interest in science and math.
- ◆ Use the Internet as a source of information.

To assist with the program, EPA published a Water Drop Patch Project booklet with detailed background information about watersheds, polluted runoff, wetlands, ground water and drinking water. The booklet is available on EPA's web page at:
<http://www.epa.gov.adopt/patch>

(EPA Water News - 10/28/99)

Scout Troop 54 stenciled this important message.

Some "Oily" Facts...



▲ One quart of oil in contaminate p to two million allons of drinking water.

◆ The amount of oil in one oil change can ruin a day's water supply for a small city. Or, put another way, just one quart of oil will ruin the taste of 250,000 gallons of water.

--U.S. Environmental Protection Agency

◆ If you pour the oil down a storm drain in the street, you are polluting nearby lakes and rivers. Did you know that most storm sewers do not go to a wastewater treatment plant? If you pour five quarts of oil from your car down the storm sewer, it can create an oil slick the size of two football fields.

--University of Wisconsin Extension Service

One oil change from one car engine poured into a storm drain can create an 8-acre oil slick, harming aquatic life and stunting or killing aquatic plants. Oil films on the surface of the water block sunlight, impair photosynthesis and prevent the replenishment of dissolved oxygen, which can lead to fish kills.

Even oil that is dumped on the ground eventually finds its way into streams, rivers and ground water. Oil stays in the environment a long time. It may take years to biodegrade.

--Texas Natural Resource Conservation Commission

Team Does Eight Pollution Reduction Projects in First Year

by Scott Kraus, Jamestown Sun staff writer

Editor's note: This article was reprinted with permission from the Jamestown Sun.

A Jamestown-based team that provides free engineering services for projects to help control nonpoint source pollution has completed eight projects and done over 40 topographical surveys in its first year, an official said.

The Best Management Practices Team, which gets 60 percent of its funding from the federal government, has helped complete over \$250,000 worth of projects, said Shane Kjellberg, agricultural engineer for the team.

The team has worked on a livestock waste treatment system, used low dikes to prevent a spring runoff stream from washing through a farmstead, designed livestock water supplies and helped to prevent bank erosion. Projects have been in the counties of LaMoure, Emmons, and Griggs. None of the projects have been in Stutsman County, yet.

The team, which consists of Kjellberg and a civil engineering technician, began working 13 months ago in July 1998. It may add a second civil engineering technician by next summer.

The team works on projects to control runoff from communities, agricultural areas, and construction sites into wetlands, streams, and lakes in the 22 counties of the watersheds for the James and Sheyenne Rivers.

Livestock can impact North Dakota's water resources.

"It will concern just about anything that affects water quality, as long as it's not point-source," Kjellberg said. "Our main focus is agriculture."

Local coordinators for the watersheds and soil conservation districts locate farmers interested in improvement projects. Then the BMP team is contacted to provide any required survey and engineering work.

For example, large cattle herds that can impact state waters now need a permit to operate. That has created work for the team.

"They had kind of a demand for these projects, and they didn't have anyone to turn to for it," he said. "So that's where the need for the team came in."

Producers who want to do a project can get 60 percent funded by the federal government under Section 319 of the 1987 amendments to the Clean Water Act.

The landowner can provide the 40 percent match with cash or in-kind services. "So a lot of them have been able to work their 40 percent off through their time and labor," he said.

The BMP team also has a truck with a drilling rig to take required bore samples of soil for some projects. The equipment cost a total of about \$48,000, and saves the landowner over leasing one for projects.

The free engineering services from the team make the project even more affordable. Landowners probably couldn't afford many of the projects if they had to pay for private engineering help.

The team members don't make anything above their yearly salaries. Kjellberg receives about \$50,000 a year, and the engineering technicians receive about \$30,000 a year.

(Team...cont. on page 5)

(*Team...cont. from page 4*)

Sixty percent of the funding for the team comes from Section 319. The funds are administered by the state Health Department. The team gets the 40 percent local match for salaries and equipment from participating agencies in the area that it covers.

The South Central Dakota Regional Council, a development group based in Jamestown, helped spearhead the formation of the team and provides office space here as an in-kind match. The BMP team's budget ran about \$138,000 the first year and \$120,000 this year for the team, according to Kjellberg.

Kjellberg graduated from North Dakota State University in Fargo 1993 with a degree in agricultural engineering. He worked at a soil and water conservation district for a year and a half, then spent three years working on watershed improvements in New York state. He enjoys the work here.

"The nice thing about this job is while I spend a lot of time in the office, I spend a lot of time in the field, too," he said.

He expects that the team will have more requests to help with projects

as it becomes better known in the area.

A BMP team in South Dakota saw demand for its services increase greatly once it had completed several projects.

"Once they got some people on the ground, and landowners were happy with it -- it sold itself," he said.

1999 Summer Institute Impresses Educators

by Bill Sharff, Project WET coordinator

The Summer Institute on Water Resources for Educators and Youth Leaders was held July 19 through 23, 1999, at the 4-H Camp near Washburn, N.D., with 37 participants attending. The institute uses a variety of outdoor investigation units (i.e., ground water, wetland, stream and lake) to study how human and natural environments interact within their watersheds.

"I feel I'm leaving much better informed. Keep doing this workshop."

- Linda Fisher, grades seven and eight counselor at West Fargo Middle School

long tour of four nearby water-use projects. Also included was a presentation about statewide and regional water resource management issues. The Summer Institute was taught by

several Project WET facilitators and many water resource professionals representing state and federal agencies, including the State Water Commission, the North Dakota Department of Health, the U.S.

Geological Survey and the Natural Resources Conservation Service.

Altogether, between the field investigation days and the programming completed at the 4-H Camp, institute participants experienced 17 hands-on interactive K-12 activities from Project WET curriculum materials. Educators had the opportunity to choose from two options for a day-

"Project WET was AWESOME!"

- Jennifer Fisk, preservice teacher at the University of North Dakota.

The Institute was funded in part by a Section 319 nonpoint source pollution grant, the State Water Commission, county water resource districts, soil conservation districts, school districts, and Cooperative Power Inc.

Next summer's institute is scheduled for July 17 through 21, 2000, at Washburn, N.D.

"I'm going home energized and full of ideas to teach my students."

- Ivan Miller, grades eight through 12 teacher at Milnor High School

Upcoming Events

December 8-9, 1999 -- North Dakota Chapter Soil and Water Conservation Society's Annual Meeting, "Carbon Sequestration Forum: Beneficial Storage of Atmospheric Carbon," Doublewood Inn, Bismarck, N.D. For more information, call Jackie Henderson at 701.530.2077 days or 701.222.4615 evenings.

January 12, 2000 -- "Diversity, Direction, and Dollars" IV Workshop, 9:30 a.m. - 4:30 p.m., Travelodge, Dickinson, N.D. Program details will be available at a later date. For more information, contact Bonnie Twogood at 701.225.3811 or your local soil conservation district or extension service office.

June 26-30, 2000 -- "The Big Muddy: River of Dreams," Missouri River Cultural History Institute, Western 4-H Camp, Washburn, N.D. Call Bill Sharff at 701.328.4833 for more information.

July 17-21, 2000 -- North Dakota Summer Institute on Water Resources, Western 4-H Camp, Washburn, N.D. Call Bill Sharff at 701.328.4833 for more information.

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